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USEPA, RCRA Branch

October 7, 1986

Mr. Michael J. Sanderson Chief, RCRA Branch Waste Management Division U.S. EPA Region VII 726 Minnesota Avenue Kansas City, KS 66101

Dear Mr. Sanderson:

This letter is sent on behalf of our client, The Maytag Company, in response to your August 8, 1986 comment letter regarding the April 1985 Closure Plan. Responses to your comments use the same numerical designation as delineated in the August 8, 1986 letter. Once the responses have been approved, they will be incorporated within the Closure Plan to provide a complete, self-supporting document.

Maytag has decided to retain interim status for the drum storage area so that corrosive wastes from Plant No. 1 can be transported to Plant No. 2 for treatment. Accordingly, Maytag has submitted a revised Part A for Plant No. 2. Such action will subject Maytag to maintaining a Closure Plan for the drum storage facility and ultimately to submittal of a Part B permit application. The Closure Plan for the drum storage facility will be separated from the Closure Plan for the incinerator facilities and the interim drum storage area since the Closure Plan for the drum storage facility will not be implemented in the near future. All other portions of the Closure Plan will be implemented upon approval.

1. The drum waste storage area has been used to store polymerized solvent based paint, paint sludge, incinerator ash and other miscellaneous wastes. Prior to January 30, 1986, none of these wastes would have been considered listed hazardous wastes, but rather would have been hazardous by ignitability or E.P. Toxicity. Thus, prior to January 30, 1986, the RCRA regulations could only require cleanup to the limits for E.P. Toxicity or ignitability. Further cleanup could be required under CERCLA authority.

Rules published in the December 31, 1985 Federal Register (effective January 30, 1986) provided that a waste comprised of at least ten percent (10%) of one or more listed wastes would be considered a listed waste. Consequently, portions of Maytag's waste, specifically the polymerized solvent based paint, would currently be considered a listed hazardous waste. Those areas used to store these wastes after January 30, 1986 are subject to cleanup standards for listed wastes. Areas subject to closure but where storage of the listed wastes did not occur are subject to the closure standards for characteristic wastes.

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For those areas subject to closure in accordance with requirements for characteristic wastes, the parameters of concern are heavy metals and ignitability. It is proposed that cleanup standards for heavy metals be established as ten percent (10%) of the E.P. Toxicity limits. A cleanup level of  $60^{\circ}$ c (140°F) for ignitability is proposed since ignitability levels in excess of those values have not been shown to present a hazard.

For those areas subject to closure in accordance with standards for listed wastes, the proposed cleanup levels for listed solvents are listed in Table 9 (page 19). Proposed cleanup levels for heavy metals and ignitability are ten percent (10%) of E.P. Toxicity and  $60^{\circ}$ c  $(140^{\circ}$ F) respectively.

The incinerator and storage tank area are subject to the closure requirements for characteristic wastes (i.e., metals - 10% E.P. Toxicity; solvents - Table 9 concentrations). The drum storage pad and the interim drum storage area are subject to closure requirements for listed wastes (i.e., background levels).

- 2. The maximum design capacity of the waste storage area is 240 fifty-five gallon drums, as indicated on page 4 and Figure 5 of the Closure Plan. The quantitites of waste indicated on page 9 of the Closure Plan represent the waste inventory at the time that the Closure Plan was prepared. Waste has been and will continue to be generated. Due to the lengthy delay since the Closure Plan was submitted, the current waste inventory consists of 134 drums of material on the storage pad and 574 drums of paint sludge stored near the Waste and Water Treatment Plant.
- 3. An additional Figure, 1A, has been added to indicate the location of all of the areas subject to RCRA closure. Figure 1A should only be used to determine the relative locations of the hazardous waste management units. Specific details and information for each unit is contained on the existing figures and in the text.
- 4. The drum storage area consists of a curbed concrete pad. Figures 4 and 5 clearly indicate the construction details. There are no known cracks that have or would allow contamination of the base material. Permeability testing of the concrete is not required. Stored waste is containerized, not stored directly on the concrete. The drum storage area is routinely inspected and any leaking drums would be replaced and any spillage immediately cleaned up and containerized.

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5. Soil sampling around the incinerator was previously addressed in the Closure Plan. No soil sampling is proposed around the storage pad since the concrete pad is fitted with concrete curbing.

There have been three spills or leaks at the drum storage pad. One incident (December 1984) involved a small amount of liquid and did not result in waste reaching the sump. Waste was cleaned up and repacked in a new drum. The first (05-15-84) and third (09-29-86) incidents involved liquid wastes. Leakage collected in the waste collection sump and was returned to a new drum. At no time did wastes leave the containment area.

- Section C, CLOSURE CRITERIA contains a detailed description of all sample collection, preservation, chain-of-custody and analytical procedures to be utilized.
- 7. The Closure Plan (c. Decontamination of Facilities, page 10) indicated that decontamination of the waste storage area was not necessary since no leakage or spillage has occurred. Since that time three drums have leaked, as indicated in response #5. Once the stored waste has been removed from the storage area, the pad and sump will be steam cleaned and any collected wastewater analyzed for total metals and organics to verify that no contamination exists. If the analytical results would show contamination above the proposed cleanup levels, the cleaning procedure will be repeated. If the collected wastewater is not hazardous, it will be sewered. If the wastewater is hazardous, it will be containerized for transport to a hazardous waste facility.
- 8. The Closure Plan identifies the locations and procedures for collection of soil samples around the incinerator facility. The proposed samples will be used as a starting point to determine whether additional sampling (horizontal and vertical) is necessary to delineate the extent of soils contaminated in excess of the proposed cleanup levels. Cleanup activities will continue until the proposed cleanup levels are met.

The stated requirements for provisions and a schedule for submission of a post closure plan and monitoring plan are only applicable to hazardous waste disposal facilities (§265.110). There is no intention nor existing data to indicate that closure to the proposed cleanup levels will not or cannot be achieved. Accordingly, there is no basis for the requested information.

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- 9. To date there have been three instances of leakage or spillage of hazardous waste at the storage pad. As noted in response #5, in two instances waste reached the sump. The contents of the sump are tested prior to discharge as stated in the Closure Plan. The sump will be thoroughly inspected for cracks and evidence of leakage at the time the Closure Plan is implemented. If evidence of cracks, leaks or contamination are found, testing of the underlying materials will be initiated to determine whether contamination has occurred. Any soils contaminated in excess of the proposed cleanup levels will be excavated and transported to a hazardous waste disposal facility.
- 10. All hazardous waste storage tanks subject to regulation, except the tank identified in response #11, are already addressed in the Closure Plan. EPA has approved steam cleaning as the method to decontaminate solvent storage tanks or facilities at other locations. The steam temperature should be sufficient to volatilize or dissolve any solvent residues. Any residues resulting from the steam cleaning of the tanks will be collected, drummed, analyzed and sewered or disposed at a hazardous waste facility depending on the analytical results.
- 11. Tank decontamination is addressed in response #10. The four (4) tanks identified in the Closure Plan are above ground tanks. As indicated in the Closure Plan, the tanks and incinerator were taken out of service prior to November 1981. The regulations do not contain any requirement relating to determining the integrity of the tanks or piping. Further, the integrity of the tanks and piping at the time of closure may differ from that prior to November 1981 when the facilities were taken out of service. The Closure Plan currently addresses soil sampling to determine whether contamination of soil around the storage tanks has occurred. Prior responses have also identified the procedures to be followed to determine the horizontal and vertical extent of contamination in excess of cleanup levels and the procedures to remove and dispose of contaminated materials. There is no basis for requiring a groundwater monitoring program for the storage tank area.

Since the initial Closure Plan was prepared, Maytag has identified a 400 gallon, mild steel, asphaltic coated, underground tank that was used to collect flush waste solvent prior to transport to the four incinerator storage tanks. There is no evidence of tank leakage. The tank was also taken out of service on or about August 1984. The tank and surrounding soils will be sampled and excavated as necessary to the cleanup levels proposed in Table 9. The location of the underground tank is identified in Figure 1A.

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- 12. Piping for the incinerator system and storage tanks is located above ground. The proposed soil sampling locations were selected such that any possible leakage from the piping system would be detected.
- 13. The operating temperatures of the incinerator preclude organic solvent residues on the incinerator itself. All other equipment and piping will be steam cleaned, as previously indicated with the collected condensate, containerized and analyzed to determine the proper disposal mechanism. Any possible spillage, such as the area beneath the incinerator, will be sampled, analyzed, excavated and resampled as indicated in the Closure Plan to reduce contaminant levels to the proposed cleanup levels. The equipment and piping will be sold for scrap or landfilled.
- 14. The only areas used to store hazardous waste in excess of 90 days were the drum storage pad, the storage tanks and the interim storage pad next to the treatment plant (see Figure 1A).
- 15. The contaminated soil will be treated in place or transported to an existing hazardous waste incinerator or landfill, depending upon the volume of contaminated soils requiring disposal. This will not be known until field testing and soils analysis are completed.
- 16. The indicated analyses will not be conducted until the Closure Plan is approved and implemented. The requested documentation would be part of the Closure Certification. All analytical work will be conducted by the University Hygienic Laboratory or another EPA approved lab. Since the lab used is EPA approved, it appears meaningless to repeat the detection limits or analytical procedures used.
- 17. The ash should not have been identified as a hazardous waste. Prior to January 30, 1986, the waste incinerated would not have been considered a listed waste but rather a D001 ignitable waste. The resultant ash is not E.P. Toxic so the ash is not a hazardous waste. Accordingly, it will be transported to a local landfill for disposal in accordance with Iowa solid waste requirements.
- 18. It is anticipated that the closure activities can be completed within 180 days of receiving final EPA approval. However, portions of the closure activities cannot proceed during inclement weather or when the soil is frozen. Depending on when EPA issued final approval, an extension may be requested.

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- 19. Without first conducting the soil borings and other analysis, it is impossible to formulate a meaningful more accurate estimate of the quantity of contaminated soil for disposal. The closure cost estimates in Tables 6 and 8 were reviewed and found to be reasonably accurate. As such, they will not be updated at this time. However, the cost estimates will be reviewed annually and updated as necessary.
- 20. The site safety plan for implementing the Closure Plan has been attached. When the comments and responses are incorporated into the final Closure Plan, the site safety plan will be included as Appendix B.
- 21. The decontamination of facilities and equipment was addressed on page 14 of the Closure Plan. Also, a previous response addressed the adequacy of steam cleaning.

Four additional soil borings with surface samples and six inch samples will be conducted in the interim storage area. Samples will be analyzed for heavy metals (E.P. Toxicity, total) and the organics listed in Table 9. The area is subject to cleanup to background levels. If analyses indicate soil contamination, contaminated soils will be excavated and resampling completed to verify decontamination.

The closure cost estimates for the drum waste storage area and the incinerator are still accurate. An additional cost estimate (Table 6A) identifies the estimated closure costs for the interim drum storage area.

I hope that this response addresses your comments. If you have any questions, please contact me.

Sincerely,

EUGENE A. HICKOK AND ASSOCIATES

Rod Vlieger, P.E. Project Manager

RV/kc

cc: Terry Townsend, Maytag

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## TABLE 6A

## CLOSURE COST ESTIMATE FOR THE INTERIM STORAGE AREA

Transport Paint Waste for Treatment or Disposal	\$ 4,000
Treat or Dispose of Paint Waste	12,000
Conduct Soil Sampling	500
Analytical Analyses	4,000
SUBTOTAL	\$20,500

NOTE: If soil contamination exists, contaminated soils will be excavated and resampling conducted to verify decontamination.

